

10 Evidence Elements

10.1 Evidence Elements Class Diagram

This sub clause defines the key concepts of the SACM Evidence Metamodel. The elements in this sub clause are defined as abstract classes and subsequent sub clauses elaborate the detail, while this sub clause provides a convenient outline of the entire vocabulary focusing at the key noun concepts.

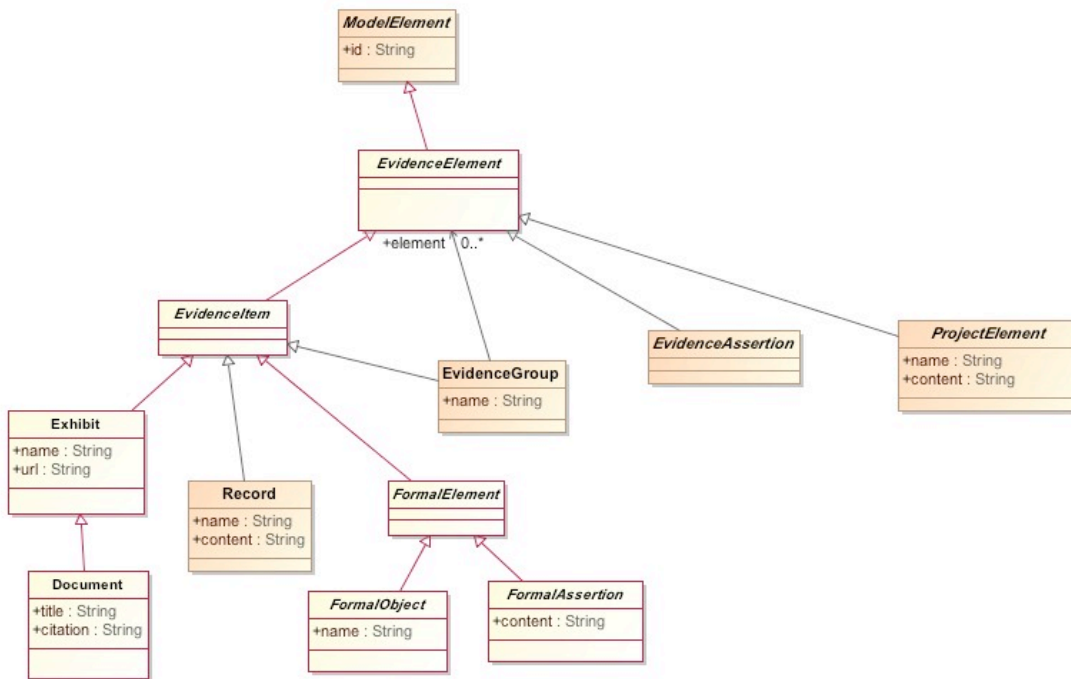


Figure 10.1 - EvidenceElements class diagram

10.1.1 EvidenceElement (abstract)

EvidenceElement class is the root element of the SACM Evidence Metamodel. All other classes in the SACM Evidence Metamodel extend EvidenceElement. The main subclass of the EvidenceElement is EvidenceItem, which defines the (things). Other elements represent various secondary elements (statements about things and other statements) and dependent parts of other evidence elements. The following elements are direct subclasses of EvidenceElement: EvidenceItem, EvidenceAssertion, and ProjectElement.

Superclass

ModelElement

primary elements of the Evidence Metamodel (things)

Associations

- provenance:Provenance[0..*]
Provenance statements where the subject is the current EvidenceElement

Associations

- attribute:EvidenceAttribute[0..*]
Set of quality attributes of this EvidenceEvaluation element.

elements

Semantics

EvidenceEvaluation element represents a statement that asserts a certain relationship between two EvidenceItems, or between an EvidenceItem and an EvidenceEvaluation, or between two EvidenceEvaluations ~~elements~~. The EvidenceEvaluation statement can include additional EvidenceAttribute clauses that provide further detail related to confidence, strength of support, etc. Since EvidenceEvaluation element is a subclass of EvidenceElement, the primary statement can also include additional EvidenceProperty clauses that provide further detail related to provenance, timing, etc.

EvidenceAttribute class is further described in section 14.3. Detailed semantics is provided for individual subclasses of EvidenceEvaluation (see section 14 EvidenceEvaluation).